

REMARKS

The rejection of claims of 11 to 14 as being directed to non-statutory subject matter is moot because these claims are cancelled.

The rejection of claims 1 and 3 to 17 as being obvious over Coppersmith (U.S. Patent No. 6,069,955) in view of Shefi (US Patent No. 6,266,413 B1) is traversed.

Claim 7: This claim is directed to marking goods to enable their authenticity to be verified. The method comprises applying public data and a security code to the goods. The security code is derived by encrypting the public data on the goods and one of a plurality of private data sets. The private data sets are held by a verifier and are not public. *See Spec. p. 5, ln. 26-27.* Claim 7 states (in part):

said security code having been derived by means of a predetermined encryption algorithm by encrypting said public data applied to the goods and **one of a plurality of private data sets held by a verifier** (Emphasis added).

The Coppersmith security code is fundamentally different to the security code set forth in claim 7, as is discussed in Applicants' Amendment of December 7, 2005. In Coppersmith, the security code is derived by encrypting public data with a private key. The security code is applied to the goods along with the public data. The public data encrypted in the security code is recovered by decrypting the security code with the public key. The decrypted public data is compared to the public data printed on the good. If the decrypted security code matches the public data, the good is verified.

Coppersmith does not disclose using private data sets to generate a security code or that multiple private data sets are to be held by a verifier. There is no need for the private data sets of claim 7 in Coppersmith and there is no suggestion for such sets. In Coppersmith, the public data

applied to the goods is encrypted using a private key to generate a security code. The security code is subsequently verified by decryption using a public key. A public key is not private data. Further, the Coppersmith security code is not generated by encrypting both public and private data.

Coppersmith teaches away from the claimed invention. References that teach away from an invention cannot be properly applied to support an obviousness rejection. *In re Gurley*, 31 U.S.P.Q.2d 1130 (Fed. Cir. 1994)(“A reference may be said to teach away when a person of ordinary skill, upon reading the reference, would be discouraged from following the path set out in the reference, or would be led in a direction divergent from the path that was taken by the applicant.”). Coppersmith (Abstract) touts as an advantage of using public/private key encryption to generate security codes for goods that there can be immediate verification of a product using only the code and public data on the goods, and a public key stored in a point of sale device. Coppersmith leads away from the current invention that requires a “private data” held by the verifier to verify a good. Because Coppersmith teaches away, it should not be applied to support an obviousness rejection.

Shefi does not suggest that the public/private key system of Coppersmith be modified to form the claimed invention. Shefi is concerned with a method for generating a one time pad so that communications can be encoded using random numbers accessible to both a sender and a receiver. Figure 1 of Shefi explains how a process can be operated at two devices such that both devices generate a common set of random numbers, the common set of random numbers being usable to encode communications.

The general principles by which a one time pad operates are described in the passage beginning at column 3 line 19 of Shefi. It is explained that both a sending and receiving party

have access to a common set of random numbers. A sender encodes a message using a particular random number, and the receiver is able to identify that random number and subsequently use that random number to decode a received communication. The passage of Shefi (col. 17, ln. 20) relied on in the Action describes that numbers generated using the one time pad can be used to encrypt messages to be transmitted from a sender to a receiver. It is explained that such encryption may be carried out by applying a XOR operation between data to be transmitted and a number obtained from the one time pad.

First, Shefi comes from a completely different technical field. The present invention and Coppersmith are concerned with the generation of security codes which enable the authenticity or otherwise of a product to be determined. In contrast, Shefi is concerned with methods for encoding data which is to be transmitted from a sender to a receiver. A person of ordinary skill using the Coppersmith technique would not consider the Shefi given that it emanates from such a different technical field and does not propose to solve any problem that would be evident to the Coppersmith technique.

Furthermore, even if the Shefi was considered (a position which we do not accept), a person of ordinary skill would not be motivated to modify Coppersmith. Specifically, Coppersmith sets forth a complete approach to verifying a security code for goods. There is nothing in Coppersmith that suggests a problem remains to be solved and there is nothing in Shefi that suggests how to improve marking goods or the technique disclosed in Coppersmith. The public/private key encryption of Coppersmith is completely opposed to the use of a one time pad which is described in Shefi. Thus, there is no apparent way in which the disclosures could be combined.

Even if the person of ordinary skill considered Coppersmith and Shefi together, he would

not arrive at the claimed invention. Specifically, Shefi is concerned with the encryption of a message using a random number. The random number (taken from the one time pad) in Shefi is effectively acting as an encryption key. That is, the message is being encrypted with, the random number. This is quite different from the encryption of both public and private data to generate a security code.

Furthermore, Shefi is at odds with the public key used in Coppersmith. Shefi aims to keep the contents of the message confidential as between sender and receiver, and to prevent that message being made available to third parties (see, for example column 1 starting at line 165). In Shefi, both the message and the random numbers must be kept private as between sender and receiver so as to prevent a third party from obtaining access to data transmitted between sender and receiver. There is no public data disclosed within Shefi. Furthermore, it is clear that there is certainly nothing in Shefi to indicate that public data is applied to goods.

The points made above similarly apply to claims 11, 15 and 16.

Claims 1 and 17: As discussed above, Coppersmith does not teach the application of a security code derived by encrypting public data applied to the goods and one of a plurality of private data sets held to a verifier. Contrary to the Action (p. 5), the security code in Coppersmith is not generated from one of a plurality of private data sets held by a verifier. For the reasons set out above and in Applicants' previous response no private data is encrypted in the method of Coppersmith. Further, Coppersmith teaches away from using private data in that he teaches using a public key as applied to the security code to allow for decryption and verification by, for example, point of sales machines equipped with a public key. The public key in a point of sales machine is not private data and one key is not a plurality of private data sets.

The reasons set forth above regarding claim 7 regarding why a person of ordinary skill

would not combine Coppersmith and Shefi and that such a combination would not result in the invention apply to claims 1 and 17. A person of ordinary skill would not have considered Shefi in the light of Coppersmith, even if he did consider Shefi in the light of Coppersmith he would make no combination, even if he attempted to make any combination it is not clear how the documents can be combined, and if the Shefi and Coppersmith were to be combined that the claimed invention would not be realized. For these reasons, as expanded above, it is submitted that the combination of Coppersmith and Shefi does not render obvious the invention of claims 1 and 17.

The rejection of claim 2 as being obvious over Coppersmith in view of Shefi and futher in view of Tran (US Paten No. 5,864,665) is traversed for the same reasons as stated above made with respect to independent claim 1 on which claim 2 depends.

In any event, it is respectfully submitted that one of skill in the art would not be motivated to consider Tran, given that it relates to a different technical field (i.e. the field of verifying user log-on details, not verifying the authenticity of goods.) Furthermore, the audit log taught by Tran for auditing log on operations is in no way comparable to the log of claim 2 which is used for verification purposes in assessing the authenticity of goods.

All claims are in good condition for allowance. If any small matter remains outstanding, the Examiner is requested to telephone applicants' attorney. Prompt reconsideration and allowance of this application is requested.

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Respectfully submitted,

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